Substance/Alcohol Use: Women, Pregnancy After Birth

Tuesday June 10, 2014
11:00-12:00

Registered Nurses Association of Ontario - Mary Mueller
Objectives:

- Examine how alcohol and substance use is changing for women in Ontario and what that means to health and social service providers
- Discuss the impact of substance use on pregnancy
- Examine the effects of substance use on newborns
- Examine evidence based strategies for prevention and harm reduction
- Look at the roles each of us can play to help in prevention and harm reduction
Prevalence of Substance Use - Women of Childbearing Years

Why Is This Important?

- Once patterns established difficult to stop substance use in pregnancy
- Risky use of alcohol/substances before pregnancy - ↑ risk of use in pregnancy
- Unplanned pregnancies 40 - 50% (Public Health Agency of Canada - 2005)
- Unplanned pregnancy - may be 8-12th week of pregnancy before aware of pregnancy
- If substance/alcohol use part of daily life - fetus exposed to potential toxins
Prevalence of Substance Use Women of Childbearing Years

Alcohol

Canada:

- 74.4% report past year alcohol consumption
- Past year alcohol use higher among 25 years and over
- 15-24 years of age are more likely to drink at risky levels
- 15.9% exceeded 10 drinks/week (Canada’s LRDG* for women)
- 9.7% exceeded 3 drinks/special occasion (Canada’s LRDG* for women)
- 20% of women in childbearing years drink 5 or more drinks/occasion once/month or more, 3 times the rate from a decade ago (CAMH, 2008)

Health Canada, Canadian Drug Use Monitoring Survey, 2012
LRDG - Canada’s Low Risk Drinking Guidelines
Prevalence of Substance Use
Women of Childbearing Years

Alcohol

Ontario:

- Past year alcohol consumption for women
  - 74.6% - 2010
  - 78.9% in 2011
- 17.1% reported exceeding the LRDG* for women (among drinkers)
- 10% reported hazardous or harmful drinking (among drinkers)
- Increases in daily drinking rates among women increased from 2.6% of women in 2001 to 5.7% in 2011

Addiction and Mental Health Indicators Among Ontario Adults 1997-2011, CAMH

*LRDG - Low Risk Drinking Guidelines
Prevalence of Substance Use Women of Childbearing Years

Tobacco
- 14% females aged 15 years and over
- Rate has decreased over past 5 years

Cannabis
- 7.0% report past year cannabis use
- Cannabis use higher for 15-24 year olds
- In 2011, 25% of those who used Cannabis reported using it on a daily basis
- Many people report using it to help them sleep

Health Canada, Canadian Tobacco Use Monitoring Survey, 2012
Health Canada, Canadian Drug Use Monitoring Survey, 2012
Prevalence of Substance Use
Women of Childbearing Years

Illicit Drug Use
- Women aged 15-44 years of age
- 1.1% report past year illicit drug use: cocaine, ecstasy, speed, hallucinogens and heroin
- Illicit Drug Use higher among youth aged 15-24

Opioids
- 16.9% Canadians, ≥15 years report past year opioid use

Health Canada, Canadian Drug Use Monitoring Survey, 2012
Prevalence of Substance Use Pregnancy

- Alcohol - 11% of women consumed alcohol
- Alcohol use in pregnancy is more commonly reported in older women
- Tobacco - 13% of women smoked cigarettes
- Tobacco use in pregnancy is more common in younger women
- Illicit Drug Use - 5% of women reported illicit drug use
- Under-reporting issue in pregnancy - social stigma - prevalence rates likely higher
- Assume if using illicit drugs - also use alcohol and may have poorer eating habits

Canadian Perinatal Health Report, 2008
Substance Use in Pregnancy - Not Simple

- 2/3 with substance use problems also have mental health issues
- Many women with substance use issues, also experience physical and sexual abuse
- Not as easy as just telling women don’t use alcohol/substances in pregnancy
- Assess and provide treatment/support for substance use, mental health issues, and abuse
- Just advising women to stop using substances in pregnancy may help lighter users
- Those using substances to cope unlikely to be helpful, and may be harmful
Risk Factors for Substance Use in Pregnancy

- Stress, mental health issues
- Low socioeconomic status - ↓ income, ↓ paying job, ↓ education, unstable housing
- Lack the support of a partner/have a partner who also has substance use issues
- Mother with cognitive impairments - consider she may have undiagnosed FASD
- Having a previous child who was exposed to alcohol/substances in pregnancy
- Women 35 years of age and older who work/drink socially (unique to alcohol)
- Women using alcohol/substances at a risky level before pregnancy
Outcome of Prenatal Substance Use Exposure on Babies/Children

Alcohol

- Alcohol crosses the placenta freely
- Most damage to brain/central nervous system - develop throughout pregnancy damage is permanent
- Fetus exposed for longer period - slower alcohol metabolism, smaller liver
- The impact of alcohol on baby depends on: when alcohol is consumed, how much is consumed and how often it is consumed
- May also depend on age, nutrition, determinants of health and genetic factors
Outcome of Prenatal Substance Use Exposure on Babies/Children

FASD:

- FASD affects 1% of population (may be as high as 2-3%) - Public Health Agency of Canada
- 5.3 - 7.6 billion dollars are spent annually to support those with FASD (birth to age 53)
- 95% have a mental illness, 60% charged with or convicted of a crime
- Rate of FASD in prisons - 10 X’s higher than general population
- Deficits: attention, memory, emotional regulation, planning/initiating activities - poor historian
- Often have normal intelligence (but still have trouble functioning and do not qualify for benefits)
- Don’t learn/generalize from past mistakes - need help to make good decisions for entire life
Outcome of Prenatal Substance Use Exposure on Babies/Children

Cannabis:

- No link demonstrated with heavy cannabis use in pregnancy and premature births, miscarriages or major physical abnormalities
- Shows affect on development/learning skills of children starting at age 3 continuing into teenage years
- Shows affect on cognitive functioning, behaviour, future substance use and mental health
- Research continues

Canadian Centre of Substance Abuse, *Clearing the Smoke on Cannabis Series Highlights*, April 2013
Outcome of Prenatal Substance Use Exposure on Babies/Children

Crystal Meth

- Very Addictive - mainly snorted, but also injected, or smoked

- Increases alertness, sense of wellbeing, and sexual arousal, euphoria, curbs appetite

- 1.2 million Americans thought to use it every week (2009), including 5% of pregnant women

- Likely to use alcohol and other illegal drugs

- Crosses placenta

Science News, July 27, 2005
Outcome of Prenatal Substance Use Exposure on Babies/Children

Crystal Meth (Methamphetamine)

- Low birth weight, cleft palates and other malformations

- In 2005, Peter Wells from U of T found that just one hit of crystal meth in mice produced long-term neurodevelopmental problems, including reduced motor coordination

- NIH longitudinal study indicated increased cognitive problems at 7.5 years, slower learning, trouble organizing their work and struggle to stay focussed

- Need more research but initial research indicates crystal meth can be as harmful or more harmful than alcohol to the developing brain

Diaz et al, Effects of Prenatal Methamphetamine Exposure on Behavioral and Cognitive Findings at 7.5 Years of Age. The Journal of Pediatrics, 2014; DOI: 10.1016/j.jpeds.2014.01.053
Outcome of Prenatal Substance Use Exposure on Babies/Children

Opioids:
- Miscarriage
- Preterm Birth, Low Birth Weight, Respiratory Failure/Disorders
- Crosses placenta and infant experiences same effects of drug as mother
- No studies have shown ↑ risk of birth defects for mothers on methadone or buprenorphine (Subutex)
- Have found birth defects with other opiates - heroin and codeine
- Babies on methadone in pregnancy show smaller head circumference and ↓ birth weight than infants with no substance use but catch up to peers as they age
- Subutex - alternative to methadone, ↓ chance of overdose, ↓ sedative effects than methadone
- Subutex not as commonly used

Licit and Illicit Drug Use During Pregnancy: Maternal, Neonatal and Early Childhood Consequences, Canadian Centre on Substance Abuse, 2013
Outcome of Prenatal Substance Use Exposure on Babies/Children

Neonatal Abstinence Syndrome Caused by Opioids (NAS):

- NAS - group of problems in newborns who were exposed to Illicit drugs in utero - problems related to withdrawal symptoms
- 0.3% of Canadian babies born with NAS
- Occurs in 60-80% of newborns born to mothers dependent on opioids
- NAS lasts 4 weeks or longer - causes problems with feeding, elimination, irritability and sleeping
- Women on methadone have higher birth weight babies/lower rates of preterm birth, lower risk of HIV and viral hepatitis
- Subutex (buprenorphine) may be less NAS effects than methadone - need more research

Licit and Illicit Drug Use During Pregnancy: Maternal, Neonatal and Early Childhood Consequences, Canadian Centre on Substance Abuse, 2013
Outcome of Prenatal Substance Use Exposure on Babies/Children

Want more information on substance use in pregnancy, effect on babies, evidence based treatment and harm reduction and effect on breastfeeding?


World Health Organization, Guidelines for the Identification and Management of Substance Use and Substance Use Disorders in Pregnancy, 2014
Strategies to Reduce Substance Use in Pregnancy

Levels of Influence - Where Can You Make a Difference

- Independent practice
- Practice of colleagues and other disciplines
- Local community supports and services
- Provincial practice, advocacy and policy
Target Groups That Require Different Approaches

All Women in their Childbearing Years

- Women struggling with Social Determinants of Health (lack of income, lack of education, lack of appropriate social support, in violent relationships, women with mental health issues, women who have had past trauma)

- Women who are working, more established career, waited until their career was more established to begin a family
Strategies to Reduce Substance Use
Women of Childbearing Age
Independent Practice

Women of Childbearing Years:

- Begin Before Pregnancy
- Screen all women for substance/alcohol use issues
- Be aware of the current research regarding substances used and their related health risks
- Provide key messages to all women on Canada’s LRDG* (2 drinks/day, 10 drinks/week, 3 drinks/special occasion, no alcohol if pregnant, planning a pregnancy)
- Add in no alcohol if you suspect you are pregnant

http://www.ccsa.ca/Eng/topics/alcohol/drinking-guidelines/Pages/default.aspx
http://www.rethinkyourdrinking.ca/

- Emphasize that LRDG* are upper limits - if do not drink even better

* LRDG - Low Risk Drinking Guidelines
Strategies to Reduce Substance Use
Women of Childbearing Age - Independent Practice

Screening Tools:
- Universal Screen for Substance Use Disorders (Best Practice Guideline soon to be released)
- T-ACE
- CAGE
- TWEAK
Universal Screening Questions for Substance Use Disorders

1. Have you ever had any problems related to your use of alcohol or other drugs? (Yes/no)

2. Has a relative, friend, doctor or other health worker been concerned about your drinking or other drug use or suggested cutting down? (Yes/no)

3. Have you ever said to another person "No, I don't have [an alcohol or drug] problem, when around the same time, you questioned yourself and FELT, "Maybe I do have a problem?" (Yes/no)

Scoring: A positive response to any one question should indicate the need for further investigation using a validated assessment tool.

(Health Canada, 2002)
Strategies to Reduce Substance Use Women of Childbearing Age - Independent Practice

T-ACE

T Tolerance  How many drinks does it take to make you feel high?
A Annoyance  Have people annoyed you by criticizing your drinking?
C Cut Down  Have you ever felt you need to cut down on your drinking?
E Eye Opener  Have you ever had a drink first thing in the morning to steady your nerves or to get rid of a hangover?

Score 1 point for each Yes
High Risk Score: 2 or more points (maximum 5 points)

www.beststart.org/resources/alc_reduction/pdf/DR_alcohol.08.pdf
www.caphc.org - search Maternal Drinking Guide
Women of Childbearing Years:

- If above LRDG* or screen positive on screen advise to cut back - offer referral to local service or online/phone support
- If using substances assess how often, how much, reason for use, self perception of use
- Connex - http://www.connexontario.ca/
- Discuss use of reliable birth control to prevent alcohol/substance exposed pregnancy
- Multi-vitamin recommended for all women of childbearing age

* LRDG - Low Risk Drinking Guidelines
Strategies to Reduce Substance Use Women of Childbearing Age - Independent Practice

Consensus on 10 Fundamental Components of FASD Prevention from a Women’s Health Determinants Perspective - Canada NorthWest FASD Research Network - February 2010

1. Respectful - creating conditions for women to discuss their experiences, identifying coping strategies and healing processes

2. Relational - change and growth occurs through interactions with others that are long-term, supportive and based in trust. This type of environment is important for care providers and support networks

3. Self-Determining - Women have the right to determine and lead their own paths of growth and change

4. Women Centered - Involves women as informed participants in their own health care, and attends to women’s overall health and safety - Empowerment, safety, and social-justice - key considerations

5. Harm Reduction Oriented - helps with immediate goals; provides variety of options/supports; focuses on both the substance use and on reducing the harms that are associated with use
Consensus on 10 Fundamental Components of FASD Prevention from a Women’s Health Determinants Perspective - Canada NorthWest FASD Research Network - February 2010

6. Trauma Informed - Consider the influence of trauma/violence on health, understand trauma-related symptoms as a way to cope, and integrate this knowledge into service delivery and policy.

7. Health Promoting - Addresses the social determinants of health and understands how they affect health.

8. Culturally Safe - Need to feel respected, safe, and accepted for who they are, with respect to their cultural identity and personal behaviours.

9. Supportive of Mothering - Supportive of women’s choices and roles as mothers, recognize the influences that a loss of custody may have on a woman - open to many options such as: part-time parenting, open adoption, kinship and elder support, shared parenting.

10. Uses a Disability Lens - Women may also have disabilities, including FASD, and other learning disabilities. Need to consider her disabilities and accommodations when developing plan of care.
Strategies to Reduce Substance Use Women of Childbearing Age - Independent Practice

Not Sure How to Ask?

► Advise client - “I ask all women about alcohol/substance use due to health/safety/pregnancy risks of alcohol/substance use”

► Situate in middle of interview

► You may begin with: “Many women drink alcohol or use substances socially. Some women may drink/use substances to relax on the weekend - “Do you ever drink alcohol/use substances?”

► Acknowledge that some women may use alcohol to cope with mental health issues or past traumas such as a loss, abuse or violence

► Ask about how much alcohol/substance is normally used/occasion and how many times/week, reason for using, self-perception of their use
Strategies to Reduce Substance Use in Pregnancy
Independent Practice

- Practice asking and referring, the more you do it the easier it is
- Ask/advise all women multiple times about alcohol/substance use in pregnancy
- Encourage all women to abstain from alcohol/substance use throughout pregnancy
- Approach in a non-judgemental gentle way - may be the first time she has shared with anyone
- Discuss the effects of alcohol/substance use on the developing baby with all women
- Refer to Motherisk if more information is needed 1-877-327-4636
- Inquire about drinking habits before pregnancy and then ask when she realized she was pregnant
- Acknowledge many pregnancies are unplanned - alcohol/substance use may have been consumed before knowing about pregnancy
- Emphasize can’t change the past but do have control over their future behaviour
Strategies to Reduce Substance Use in Pregnancy
Independent Practice

▶ Offer to provide further support/referrals if the woman wants addiction treatment

▶ Support can take many forms - addiction counselling, listening, a trusting relationship, help with determinants of health (give prenatal vitamins), relationship counselling - assess for abuse

▶ Tell her that she and her baby deserve a life free of alcohol/substances - she is worth it!

▶ Sometimes role may be harm reduction - alcohol (? crystal meth) are the substances that we are aware of that causes the most permanent harm to the developing baby

▶ If a women has consumed alcohol or substances in pregnancy, document in her file after she leaves Why? - Must be confirmed alcohol use to diagnose FASD in the future

▶ Thank her for sharing and encourage her to come back and talk again
Postpartum Support Equally Important
Independent Practice

- If changes were made in pregnancy motivating factor may have been developing baby
- Acknowledge that temptation to use/abuse may be hard after birth of baby but emphasize she is worth it and encourage her to reach out for help
- Mother needs help/support/repeated check ins to maintain changes
- Assess for perinatal mood disorder, relationship with partner, stress, abuse
- Discuss effects of substance use on breast milk content
- Ensure she is on reliable birth control to prevent unplanned pregnancy
- Encourage all women to take a multivitamin
- Baby may seem fine initially, note on file substance exposed - development should be monitored until well into school age - earlier intervention will make a difference
Level 1: Raising Awareness
Involves broad awareness building and health promotion efforts - media campaigns

Level 2: Brief Counselling with Girls & Women of Childbearing Age
Discussion of alcohol use and related risks with all women of childbearing years and their support networks

Level 3: Specialized Prenatal Support
Specialized holistic support of pregnant women with alcohol and other health/social problems

Level 4: Postpartum Support
Postpartum support for new mothers assisting them to maintain/initiate changes to support the development of their children. Postpartum women are considered to be preconception

Policies That Decrease Alcohol Consumption

Prevention of FASD

Fetal Alcohol Spectrum Disorder (FASD) Prevention: Canadian Perspectives - Multiple Approaches to FASD Prevention (2005)
Working with Women of Childbearing Age/Pregnant Better Practices - Influencing Your Colleagues

Levels of Influence - Where Can You Make a Difference

► Talk about the risks of alcohol/substance use for women/pregnancy with your colleagues
► Share your knowledge/successes/challenges - review this powerpoint with them
► Do some presentations/post recent studies at various teams within/outside your organization
► Post on internal sharing sites - post on provincial sharing sites
► Become active in your professional association
Levels of Influence - Where Can You Make a Difference?

Problem:

- Women were sharing substance use issues at local CPNP programs,
- Referrals made to addiction service for pregnant women,
- Not all women followed up with referral or required a lot of work to get them there
- Unsure how babies exposed to substances in pregnancy were being assessed/followed after their birth
- Initially, many babies appear fine
- The earlier delays are identified the more successful the intervention.
Working with Pregnant Women
Better Practices - Influencing Your Local Community

Levels of Influence - Where Can You Make a Difference?

Strategy:

- Discussed issue with many partners (email, phone, in person) and together we decided to meet to discuss how we could make things work better.
- Initially met with CPNP, local addiction service for pregnant women and infant development program.
- Addiction service now comes to CPNP program once/month to increase familiarity and trust of clients.
- All women who have used some substances in pregnancy are offered infant development service.
- Babies to age 6 are assessed and parents are given suggestions on how to stimulate development if a problem or delay occurs.
- Children are referred to more intensive treatment if needed.
Working with Pregnant Women
Better Practices - Influencing Your Local Community

Levels of Influence - Where Can You Make a Difference?

Strategy:

- During discussions became evident need to invite Family and Children’s Services
- Addiction service could not accept referrals for women ≤18 years of age, referred to another service, invited that service to attend
- Local agency supporting homeless youth - working independently expressed a desire to work on the issue - reached out and invited them
- Initial goal was to increase follow through of referrals
- Blossomed to agencies educating each other, looking at how we can make things better for pregnant women using substances in our community
- What are the community challenges? What are the community strengths?
- The issue is on the table and people are discussing it and working together
Working with Pregnant Women
Better Practices - Provincial Practice/Policy

Levels of Influence - Where Can You Make a Difference

Issue:

▶ Individual health departments trying to address FASD and the rising rates of alcohol use for women in childbearing years
▶ One health department sent province wide email asking what was being done in areas of Ontario
▶ Another health department who was also working on the issue suggested they work together on effective strategies
▶ Four other health departments joined
Working with Pregnant Women
Better Practices - Provincial Practice/Policy

Levels of Influence - Where Can You Make a Difference

- Health Departments are sharing information/building on each other’s knowledge
- Developing a comprehensive screening approach for alcohol use to be used with all women of childbearing age in sexual health clinics (may also be used in STI and immunization clinics)
- Will review low risk drinking guidelines
- Assess current drinking patterns, provide key messages on: risks of drinking for women; risk of alcohol use in pregnancy and safety issues
- If needed will refer to local addiction service
- If a woman is drinking will encourage the use of effective birth control every time they have sex to prevent alcohol exposed pregnancies
- Once implemented evaluate, hope to take strategy to universities, colleges, primary care practices
Working with Pregnant Women
Better Practices - Provincial Practice/Policy

Levels of Influence - Where Can You Make a Difference

Issue: Lack of provincial action/awareness on prevention of FASD and effective practices for those coping with FASD

Solution:

- Two R.N.’s in Waterloo Region develop resolution giving RNAO the mandate to advocate for effective Ontario action on the prevention, diagnosis intervention and support of FASD
- Unanimously approved in 2012 at the Annual General Meeting
Levels of Influence - Where Can You Make a Difference

- Small work group formed
- RNAO is a larger organization that has the expertise and political respect to have an effect on the issue
- Globe and Mail article on FASD and its effects
- FASD Awareness Day - quiz on RNAO website
- RN Journal article outlining the issue in December 2013
- First webinar on Alcohol/Substance Use in pregnancy - December 2013
- Presentation to Select Committee on Developmental Services - FASD part of Interim Report
- 2nd webinar today
Levels of Influence - Where Can You Make a Difference

Issue:

- Practice and belief that raising awareness on the dangers of drinking alcohol in pregnancy will prevent alcohol exposed pregnancies and FASD

- Lack of provincial knowledge regarding the actual cost of FASD in Ontario
Working with Pregnant Women
Better Practices - Provincial Advocacy/Policy

Levels of Influence - Where Can You Make a Difference

- Joined FASD ONE (Fetal Alcohol Spectrum Disorder Ontario Network of Expertise) Prevention Action Group
- Work with others across the province on plans/actions to create the biggest impact on prevention or reduction of FASD
- Recommend evidence informed strategies for prevention, diagnosis, intervention and support and the justice system
- Create a provincial “Call To Action” for the government of Ontario to advocate for and guide future actions on FASD
Working with Pregnant Women
Better Practices - Provincial Practice/Policy

Levels of Influence - Where Can You Make a Difference

- Working alone - moderately effective
- Working together - effective and wise use of resources
- Evaluating success of strategy - more effective

- Developing policy across the province to ensure all women of childbearing age screened for alcohol use - most effective
Thank you

Questions or Comments?
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References

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